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 APPLICATION NO.
 FILING DATE
 FIRST NAMED INVENTOR
 ATTORNEY DOCKET NO.
 CONFIRMATION NO.

 09/768,512
 01/25/2001
 Hiroshi Kodama
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 5316

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 03/24/2004
 EXAMINER

SUGHRUE, MION, ZINN, MACPEAK & SEAS, PLLC 2100 Pennsylvania Avenue, N.W. Washington, DC 20037

ART UNIT PAPER NUMBER

TRAN, HIEN THI

DATE MAILED: 03/24/2004

1764

Please find below and/or attached an Office communication concerning this application or proceeding.

		Application No.	Applicant(s)	_t/	
		09/768,512	KODAMA ET AL.		
	Office Action Summary	Examiner	Art Unit		
		Hien Tran	1764		
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply					
A SH THE I - Exter after - If the - If NC - Failu Any	ORTENED STATUTORY PERIOD FOR REPLEMAILING DATE OF THIS COMMUNICATION. Insions of time may be available under the provisions of 37 CFR 1. SIX (6) MONTHS from the mailing date of this communication. Period for reply specified above is less than thirty (30) days, a represence of the reply within the set or extended period for reply will, by statusticed patent term adjustment. See 37 CFR 1.704(b).	.136(a). In no event, however, may a reply be tir oly within the statutory minimum of thirty (30) day I will apply and will expire SIX (6) MONTHS from te, cause the application to become ABANDONE	nely filed s will be considered timely. the mailing date of this communication. D (35 U.S.C. § 133).		
Status					
1)[Responsive to communication(s) filed on	·			
2a) <u></u> ☐	This action is FINAL . 2b)⊠ Thi	is action is non-final.			
3)□	3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.				
Dispositi	on of Claims	•			
 4) Claim(s) 1-7 is/are pending in the application. 4a) Of the above claim(s) is/are withdrawn from consideration. 5) Claim(s) is/are allowed. 6) Claim(s) 1-7 is/are rejected. 7) Claim(s) is/are objected to. 8) Claim(s) are subject to restriction and/or election requirement. 				-	
	on Papers				
	The specification is objected to by the Examin	er.			
10)⊠ The drawing(s) filed on <u>18 April 2001</u> is/are: a)⊡ accepted or b)⊠ objected to by the Examiner.					
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).					
11)	Replacement drawing sheet(s) including the correct The oath or declaration is objected to by the E				
Priority ι	ınder 35 U.S.C. § 119				
 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received. 					
Attachmen	t(s)		.*		
1) Notice of References Cited (PTO-892) 4) Interview Summary (PTO-413)					
3) 🔯 Infor	te of Draftsperson's Patent Drawing Review (PTO-948) mation Disclosure Statement(s) (PTO-1449 or PTO/SB/08 or No(s)/Mail Date 7/25/03 & 1/9/04.	Paper No(s)/Mail D 5) Notice of Informal F 6) Other:	ate Patent Application (PTO-152)	٠	

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DETAILED ACTION

Priority

1. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

Drawings

- 2. Figures 4-9 should be designated by a legend such as --Prior Art-- because only that which is old is illustrated. See MPEP § 608.02(g). A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.
- 3. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(5) because they do not include the following reference sign(s) mentioned in the description: "n" (page 6, line 20). A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.
- 4. The drawings have not been checked to the extent necessary to determine the presence of all possible minor errors. Applicant's cooperation is requested in correcting any errors of which applicant may become aware in the drawings to comply with CFR 1.84(p)(5), e.g. they should include the reference sign(s) mentioned in the specification and vice versa.

Specification

5. The disclosure is objected to because of the following informalities:

On page 2, line 2 --diffusionally-- is misspelled.

On page 7, lines 13-14 "solder-risin g" should be changed to --solder-rising--

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Appropriate correction is required.

6. The specification has not been checked to the extent necessary to determine the presence of all possible minor errors. Applicant's cooperation is requested in correcting any errors of which applicant may become aware in the specification.

Claim Rejections - 35 USC § 112

Claim Objections

Claims 1, 3 are objected to because of the following informalities:In claim 1, lines 10, and 12 --metallic-- is misspelled. See claim 3, lines 3, 4, 10 likewise.Appropriate correction is required.

Claim Rejections - 35 USC § 112

- 8. The following is a quotation of the second paragraph of 35 U.S.C. 112:
 - The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
- 9. Claims 1-2 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claim 1, line 15 it is unclear as to whether the brazing material is the same as to the brazing foil material set forth in line 8.

Claim Rejections - 35 USC § 102

10. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

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11. Claims 3, 5-7 are rejected under 35 U.S.C. 102(b) as being anticipated by Usui et al (4,948,774 or 5,026,611).

Usui et al discloses a metallic carrier for a catalytic converter comprising:

a corrugated sheet 4 made of metal;

a flat sheet 3 made of metal;

a core 1 formed by superposing the corrugated sheet and the flat sheet one on another and by rolling the corrugated sheet and the flat sheet in multiple times;

a brazing material surrounding an outer periphery of an exhaust gas outlet side and an exhaust gas inlet side of the core; and

a metallic outer cylinder 6;

wherein an assembly including the core and the brazing material is forcedly enclosed in said metallic outer cylinder 6 (col. 7, lines 25-30 in Usui '774 and col. 6, lines 25-32 in Usui '661);

wherein the metallic outer cylinder 6 is subjected to heat treatment to join the corrugated and flat sheets, and to join an inner periphery of the metallic outer cylinder and an outer periphery of the core by the brazing material; and

wherein a solder-rising preventing groove 7 is defined over an entire circumference of the inner periphery of the outer cylinder 6 at a position located on an exhaust gas inlet side of an area for joining the core.

Instant claims 3, 5-7 structurally read on the apparatus of Usui et al.

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Claim Rejections - 35 USC § 103

- 12. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 13. The factual inquiries set forth in *Graham* v. *John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:
 - 1. Determining the scope and contents of the prior art.
 - 2. Ascertaining the differences between the prior art and the claims at issue.
 - 3. Resolving the level of ordinary skill in the pertinent art.
 - 4. Considering objective evidence present in the application indicating obviousness or nonobviousness.
- 14. Claim 1-2, 4 are rejected under 35 U.S.C. 103(a) as obvious over Usui et al (4,948,774 or 5,026,611) alone or in view of JP 08-141413 and Nonnenmann et al (4,248,186).

Although Usui et al is silent as to whether the corrugated sheet and the flat sheet may be diffusionally joined, such diffusion joining is directed to method limitation which is of no patentable moment in apparatus claims.

It appears that the claim is a product-by-process claim and when the patentability of a product-by-process claim is determined, the relevant inquiry is whether the product itself is patentable. *In re Brown*, 459 F.2d 531, 535, 173 USPQ 685, 688 (CCPA 1972). If a product is the same as or would have been obvious to one having ordinary skill in the art from a product of the prior art, the product is unpatentable even though the prior art product was made by different process. *In re Thorpe*, 777 F.2d 695, 697, 227 USPQ 964, 966 (Fed. Cir. 1985).

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Since the product of the instant claim is substantial the same as that of Usui et al, it is unpatentable even though the product of Usui et al may be made by different process.

Similar, the features of "brazing foil material wound around" and "press-fitted" are directed to a method of manufacturing the metallic carrier which are of no patentable moment in apparatus claims for the same reasons set forth above. It should be noted that the method of forming the device is not germane to the issue of patentability of the device itself.

Note that since the core and the brazing material in Usui et al is forcedly enclosed in said metallic outer cylinder 6 (col. 7, lines 25-30 in Usui '774 and col. 6, lines 25-32 in Usui '661) which is considered as "press-fitted".

In any event, it would have been obvious to one having ordinary skill in the art at the time the invention was made to select an appropriate method for connecting the sheets and using the brazing foil for joining the core to the outer cylinder as taught by JP 08-141413 and press-fitting the core and brazing material into the outer cylinder as taught by Nonnenmann et al in the apparatus of Usui et al, as an alternative methof of manufacturing the metallic carrier, as such is conventional in the art and no cause for patentability here.

Conclusion

15. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Hien Tran whose telephone number is (571) 272-1454. The examiner can normally be reached on Tuesday-Friday from 7:30AM-6:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Glenn Caldarola can be reached on (571) 272-1444. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Hren I ran

HT March 22, 2004 Hien Tran Primary Examiner Art Unit 1764